



3M™ PELTOR™ ComTac™ VIII Headsets (EMEA / APAC Version)

Product Description



The 3M™ PELTOR™ ComTac™ VIII Headset helps protect your hearing and can help promote auditory situational awareness and communication in challenging acoustical environments. Some versions are equipped with a download cable for connection to a radio via a push-to-talk (PTT), and a noise cancelling speech microphone for communication in noise.

Key Features

- Environmental listening for auditory situational awareness
- Hearing protection to help protect from impulse and steady state noise
- Advanced listening mode featuring Mission Audio Profiles (MAP) to maximize audibility based on the acoustical environment
- Noise-cancelling speech microphone (IP68) for communication in noise (select models)
- Earplug mode to help maintain auditory situational awareness when used in combination with earplugs
- Soundscaping to help with radio communication speech intelligibility
- Tested in accordance with applicable sections of a variety of military and other standards

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Applications

The 3M™ PELTOR™ ComTac™ Headsets are designed to be used by military and law enforcement.

Approvals

Hereby, 3M Svenska AB declares that the product is in compliance with appropriate directives or regulations to fulfill the requirements for the CE marking. The full text of the EU declaration of conformity is available at the following internet address: www.3M.com/PELTOR/DOC. A copy of the declaration of conformity and additional information required in the directives or regulations can also be obtained by contacting 3M in the country of purchase.

In the box

- 1x ComTac VIII headset
- 1x User Instructions
- 2x AAA Alkaline batteries

Technical Data Specifications

General

- **Model/Region:** ComTac VIII / EMEA and APAC
- **Ghost Voice Language Options:** English (default), Spanish, French, German
- **Soundscape:** Yes
- **Battery Compartment:** Sealed enclosure. Single-sided
- **Headband Style:** Adjustable low profile rubberized band. Convertible to helmet attachment.
- **Earcup Style:** Low profile. Over-the-ear
- **Speech Microphone Type:** Telescope. Dynamic. Noise-cancelling. Waterproof (IP68), 3m / 30 min
- **Speech Microphone Frequency Response:** 200 Hz ~ 7 kHz
- **Speech Microphone Impedance:** Approximately 150 Ohm
- **Download Cable Type / Length:** Straight. Kevlar® Spun / Approximately 500 mm.

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Download Plug Options

- **Single Comm: NATO wired** Plug type: 4-pin U/174 (-86)
- **Single Comm: PELTOR wired** Plug type: 4-pin U/174 (-38)
- **Dual Comm:** Plug type: 5-pin U-384/U (-35)

Environmental Listening Function

- **Mission Audio Profiles (MAP) Default:** Observation, Patrolling, Conversation, Comfort, OFF
- **Classic:** 4 Amplification Levels and OFF
- **Ear Plug Mode:** Yes

Power / Electrical Characteristics

- **Battery Type:** 2x AAA Alkaline (LR03)
- **Operating Time:** Approximately 50 hours

Military Test Standards

- **Environmental Performance:** Tested in accordance with MIL-STD-810H
- **Electromagnetic Interference:** Tested in accordance with MIL-STD-461G

Physical Characteristics

- **Weight with Batteries:** (-02): 294 g (10.37 Oz). (-86): 339 g (11.95 Oz)
- **Color Options:** Charcoal Grey (GE) / O.D Green (GN)

Environmental Characteristics

- **Operating Temperature*:** -40°F / -40°C to 131°F / 55°C
- **Storage Temperature:** ≤72h: -67°F / -55°C to 159.8°F / 71°C . >72h: -4°F / -20°C to 104°F / 40°C
- **Product Lifetime:** 5 years, excluding batteries, in room temperature
- **Salt Water Survivability:** Salt water (5%) 2m at 30 min
- **Recommended Storage Conditions:** 5 years: Indoor Controlled Climate (<90% humidity)

IMPORTANT NOTE

*In freezing temperatures, warm up the earmuffs before use.

Approvals

- **PPE Regulation 2016/425** EN 352-1:2020, EN 352-4:2020, EN 352-6:2020
- **EMC Directive 2014/30/EU**
- **ROHS Directive 2011/65/EU**

Laboratory Noise Attenuation Standard EN 352-1:2020

3M strongly recommends personal fit testing of hearing protectors. Research suggests that users may receive less noise reduction than indicated by the attenuation label value(s) on the packaging due to variation in fit, fitting skill, and motivation of the user. Refer to applicable regulations and guidance on how to adjust attenuation label value(s). In the absence of applicable regulations, it is recommended that the attenuation label value(s) be reduced to better estimate typical protection. The attenuation rating (SNR) was obtained with the device powered off.

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Table 1: **MT14H418A Headband with foam cushion**

	f(Hz)											
	125	250	500	1000	2000	4000	8000	H	M	L	SNR	Weight
MV (dB)	12.6	18.1	29.1	30.5	31.9	43.7	39.4	34	27.4	19.7	29.8	339 g
SD (dB)	2.3	1.5	3.3	2.6	2.2	2.5	2.7	1.3	1.1	1.6	1.0	
APV = MV - SD. (dB)	10.3	16.6	25.8	27.9	29.7	41.2	36.7	33	26	18	29	

Table 2: **MT14H418A with HY80 Headband with gel cushion**

	f(Hz)											
	125	250	500	1000	2000	4000	8000	H	M	L	SNR	Weight
MV (dB)	12.1	17.8	29.2	34.9	33.9	43.2	39.3	36.3	28.1	19.3	30.4	374 g
SD (dB)	2.2	1.4	2.9	2.2	2.2	3.2	3.3	1.2	1.3	1.8	1.2	
APV = MV - SD. (dB)	9.9	16.4	26.3	32.7	31.7	40.0	36.0	35	27	18	29	

Table 3: **MT14H418A with 3M™ E-A-R™ Classic Earplugs Dual protection mode, ComTac™ VIII Headset with E-A-R™ Classic Earplugs**

	f(Hz)											
	125	250	500	1000	2000	4000	8000	H	M	L	SNR	Weight
MV (dB)	34.4	44.4	53.2	45.8	40.0	48.7	43.8	41.4	42.8	41.1	43.2	339 g
SD (dB)	4.7	4.3	6.4	5.1	4.9	4.6	4.0	4.1	3.5	3.7	3.4	
APV = MV - SD. (dB)	29.7	40.1	46.8	40.7	35.1	44.1	39.8	37	39	37	40	

CAUTION

When worn according to the User Instructions, these hearing protectors help reduce exposure to both continuous noises, such as industrial noises and noises from vehicles and aircraft, as well as very loud impulse noises, such as gunfire. It is difficult to predict the required and/or actual hearing protection obtained during exposure to impulse noises. For gunfire, the weapon type, number of rounds fired, proper selection, fit and use of hearing protection, proper care of hearing protection, and other variables will impact performance. To learn more about hearing protection for impulse noise, visit www.3M.com/hearing.

Impulsive Peak Insertion Loss

ComTac VIII Headband with gel cushions; MT14H418A

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Table 4: Vol/Gain: Off

Test Level Nominal Impulsive Peak Level (dB SPL)	Impulsive Peak Insertion Loss (IPIL) (dB)	Standard Deviation (dB)
132	16.1	2.5
150	24.4	1.6
68	32.7	0.8

Table 5: Vol/Gain: Advance mode observation max volume

Test Level Nominal Impulsive Peak Level (dB SPL)	Impulsive Peak Insertion Loss (IPIL) (dB)	Standard Deviation (dB)
132	13.4	1.2
150	23.5	1.9
168	32.7	0.8

Table 6: Vol/Gain: Unity (Classic mode, Max volume, Down 1 step)

Test Level Nominal Impulsive Peak Level (dB SPL)	Impulsive Peak Insertion Loss (IPIL) (dB)	Standard Deviation (dB)
132	15.3	2.5
150	24.0	2.1
168	32.9	1.0

WARNING

These hearing protectors help reduce exposure to hazardous noise and other loud sounds. Misuse or failure to wear hearing protection at all times that you are exposed to noise may result in hearing loss or injury. For correct use, consult supervisor and User Instruction, or call 3M PSD Technical Service in the USA at 1-800-665-2942.

Headset Models

Table 7: ComTac Headset Models

Part number	Description	SAP ID	Connector
MT14H418A-02 GE	3M™ PELTOR™ ComTac™ VIII Hearing Defender, Charcoal Grey, 10 ea/cs	7100321396	No
MT14H418A-02 GN	3M™ PELTOR™ ComTac™ VIII Hearing Defender, O.D. Green, 10 ea/cs	7100322593	No
MT14H418A-35 GE	3M™ PELTOR™ ComTac™ VIII Headset, Charcoal Grey, 10 ea/cs, 5-pin	7100322482	5-pin Dual-COMM
MT14H418A-35 GN	3M™ PELTOR™ ComTac™ VIII Headset, O.D. Green, 10 ea/cs, 5-pin	7100322310	5-pin Dual-COMM
MT14H418A-86 GE	3M™ PELTOR™ ComTac™ VIII Headset, Charcoal Grey, 10 ea/cs, 4-pin (NATO)	7100320871	4-pin Single-COMM (NATO)

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Part number	Description	SAP ID	Connector
MT14H418A-86 GN	3M™ PELTOR™ ComTac™ VIII Headset, O.D. Green, 10 ea/cs, 4-pin (NATO)	7100320872	4-pin Single-COMM (NATO)
MT14H418A-38 GE	3M™ PELTOR™ ComTac™ VIII Headset, Charcoal Grey, 10 ea/cs, 4-pin (PELTOR)	7100321460	4-pin Single-COMM (PELTOR)
MT14H418A-38 GN	3M™ PELTOR™ ComTac™ VIII Headset, O.D. Green, 10 ea/cs, 4-pin (PELTOR)	7100321461	4-pin Single-COMM (PELTOR)
MT14H418A-90	3M™ PELTOR™ ComTac™ VIII Headset, O.D. Green, 10 ea/cs, LEMO	7100321699	LEMO
MT14H418A-108 GN	3M™ PELTOR™ ComTac™ VIII Headset, O.D Green, 10 ea/cs, 10-pin	7100322251	10-pin Dual-COMM
MT14H418A-108 GE	3M™ PELTOR™ ComTac™ VIII Headset, Charcoal Grey, 10 ea/cs, 10-pin	7100322003	10-pin Dual-COMM

Replacement Parts and Accessories

Table 8: Replacement Parts and Accessories

Reference Number	Part Number	Description	3M SAP ID
1	M194/2	3M™ PELTOR™ ComTac™ VII,VIII, IX. Wind Shield Kit for Surround Mic, Pair	7100232688
2	1086 SV/1	3M™ PELTOR™ ComTac™ VII,VIII, IX. Battery Lid	7100232689
3	AGM/1	3M™ PELTOR™ ComTac™ VII,VIII, IX. Headband	7100227486
4	A47/1	3M™ PELTOR™ ComTac™ VII,VIII, IX. Microphone Guide	7100227492
5	MT71/1	3M™ PELTOR™ ComTac™ VII,VIII, IX. Boom Microphone dyn.	7100230581
6	P3ADG47-F SV/2	3M™ PELTOR™ ComTac™ VII,VIII, IX. ARC Rail Attachment. Pair	7100227493
7	HY68 SV	3M™ PELTOR™ Hygienekit. Pair	7000108023
8	HY80 A	3M™ PELTOR™ Replacement Gel Cushions. Pair	7100014310
9	M42/1	3M™ PELTOR™ Large Windshield for speech microphone	7000039687
10	HYM1000	3M™ PELTOR™ Protection tape for speech microphone	7100064281

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Reference Number	Part Number	Description	3M SAPI D
11	M171/2	3M™ PELTOR™ Wind shield for speech microphone. Pair	7100112112
12	A46/4	3M™ PELTOR™ ComTac™ VII,VIII, IX. 4 x Guides	7010044799
13	PPN: 23-0052	3M™ PELTOR™ Cable Splitter: 5-pole female to dual 4-pole (NATO) male	N/A

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Figure 1: ComTac Headset Components

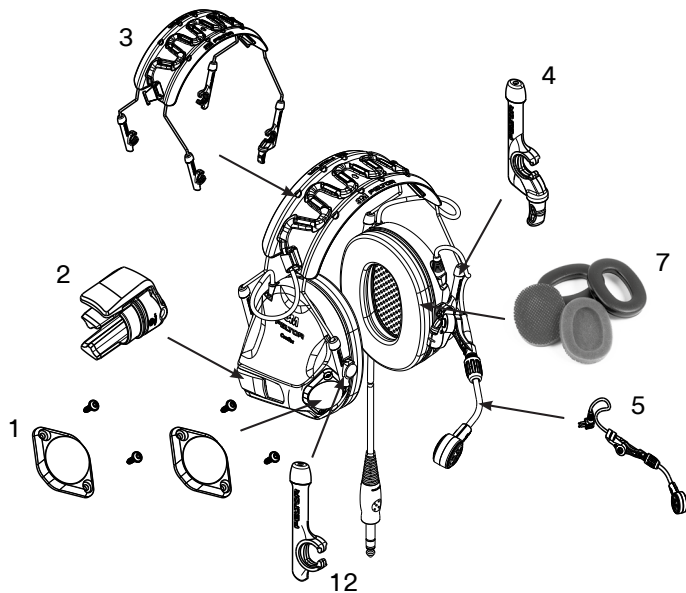
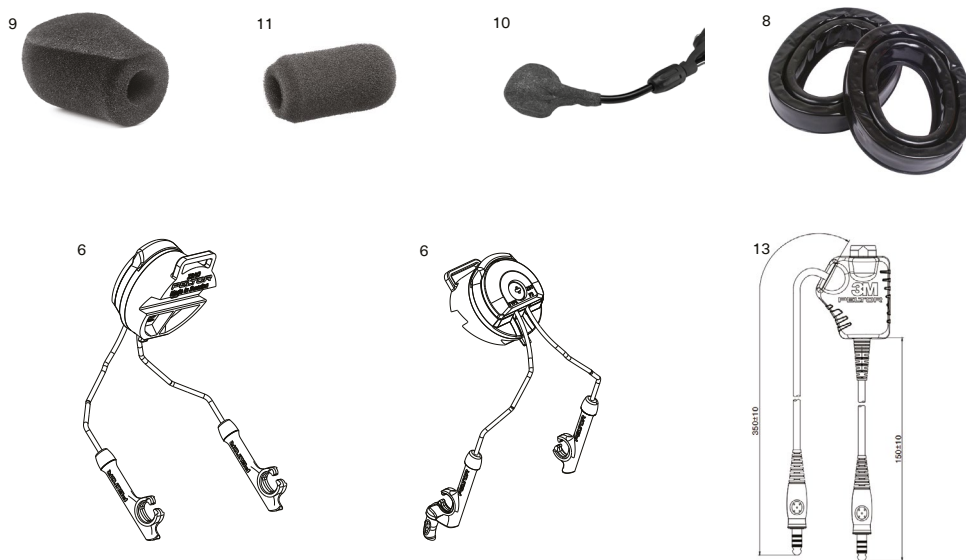


Figure 2: ComTac Headset Accessories



Warranty and Important Notice

Warranty

The warranty does not cover any damage caused by neglected maintenance or careless handling. For more information on maintenance, please see the user instruction. For complete warranty condition, contact your dealer or local 3M office.

Important Notice

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Revision B

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